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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/975,343	10/11/2001	Akira Ishikawa	06837-123002	1181

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FISH & RICHARDSON PC
225 FRANKLIN ST
BOSTON, MA 02110

EXAMINER

RESAN, STEVAN A

ART UNIT	PAPER NUMBER
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1773

DATE MAILED: 04/02/2003

16

Please find below and/or attached an Office communication concerning this application or proceeding.

AS-10

Office Action Summary

Application No.

09/975,343

Applicant(s)

ISHIKAWA ET AL.

Examiner

Stevan A. Resan

Art Unit

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 28 August 2002 and 14 January 2003.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,2,5,6 and 9-36 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 1,2,5,6,9,20 and 21 is/are allowed.
- 6) ☒ Claim(s) 10,12-14,16-19,22-31 and 33-36 is/are rejected.
- 7) ☒ Claim(s) 11,15 and 32 is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 4 and 9. 6) ☐ Other: _____

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1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Applicants refusal of the request to identify the most significant art is noted. The request arose from the desire of the examiner to advance prosecution and avoid inadvertently missing passages which were most significant and material to the prosecution which is more likely when a large number of references are submitted.
3. It is noted that this application appears to claim subject matter disclosed in prior Application No. 09/554678, filed 7-17-2000. A reference to the prior application must be inserted as the first sentence of the specification of this application. For benefit claims under 35 U.S.C. 120, the reference must include the relationship (i.e., continuation, divisional, or continuation-in-part) of all nonprovisional applications. Also, the current status of all nonprovisional parent applications referenced should be included.
4. Claims 1,2,5,6,9,20 and 21 are deemed allowable
5. Claims 11,15, and 32 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
6. Claims 27-30 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.
7. Claims 18,27-30 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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Claim 18 is deemed indefinite since it is not clear what regular patterns are encompassed which have "widths".

Claim 27 is deemed indefinite since it claims a metallic layer that contains depressions that comprise the servo pattern. However Claim 22 only claims the metallic layer "for use in producing a servo pattern" and therefore only limits an intended use and not the article itself.

Claims 28-30 are rejected for depending from a claim rejected under 35 USC 112.

8. Claims 10,19,22-24 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Henkes Jr. US 3239841 (See Figures 2a-2d.)

9. Claims 12-14,16-18,25-26,31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Henkes Jr. as applied to claims 10,22 above, and further in view of Glenn Jr. US 3113179.

Henkes Jr. does not teach a thickness of less than 7 microns as in claims 14, 31. However it would have been obvious to one of ordinary skill in the art to minimize thickness to maximize data which could be recorded on a given diameter reel.

Henkes Jr does not teach the coefficient of friction as in claim 16. However the use of a lubricant coating to regulate the coefficient of friction is old in the magnetic recording art. It would have been obvious to one of ordinary skill in the art to minimize the coefficient of friction on sliding surfaces by coating with a lubricant.

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Claim 18 appears within the normal range of dimensions of an optical servo track. It would have been obvious to one of ordinary skill in the art to adjust the servo track dimensions depending upon the servo beam tracking equipment used.

It also would have been obvious to one of ordinary skill in the art to apply a back coat layer (as in claim 17) in order to control static electrical buildup and to employ an intermediate layer between the substrate and magnetic layer (as in claims 25,26) in order to enhance adhesion or orientation of the magnetic layer as was known in the art at the time of the invention. Since color information was required on the metal layer of the Glenn Jr. media it would have been obvious to one of ordinary skill in the art to apply the pattern photographically in a color which maximized the sensitivity of the corresponding irradiated light wavelength (as in claims 12,13).

10. Claims 33-36 are rejected under 35 U.S.C. 103(a) as being unpatentable over DiStefano et al US 4684547.

DiStefano et al discloses a magnetic tape (Fig. 1) comprising a magnetic layer on a recording side of a substrate and a metallic layer which may be deposited on the non magnetic recording side of the substrate (Col 2 lines 5-6; Col 5 lines 44-53).

Substitution of equivalents requires no express motivation as long as the prior art recognizes the equivalency.

In re Fount 213 USPQ 532 (CCPA 1982); In re Siebentritt 152 USPQ 618 (CCPA 1967); Graver Tank & Mfg. Co. Inc. v. Linde Air Products Co. 85 USPQ 328 (USSC 1950).

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The metallic layer having depressions comprising a servo pattern formed thereon and which patterned metallic layer may be over coated with a thin organic layer which thus would meet the limitation of claim 34. The examiner must give the claim its broadest interpretation and since the metallic layer is not claimed as continuous the metal pattern layer of DiStefino meets the claim language. However since DiStefino also teaches a metal layer beneath the metallic pattern layer it is also deemed to read on a continuous layer.

Claims 35,36 appear within the normal range of dimensions of an optical servo track. It would have been obvious to one of ordinary skill in the art to adjust the servo track dimensions depending upon the servo beam tracking equipment used.


11. Applicant's amendments and arguments with respect to original remaining claims 1,2,5,6,9 are persuasive as the depressions are in the metal layer and accordingly these claims have been deemed allowable. However applicant's arguments with respect to claim 10 have been considered but are moot in view of the new ground(s) of rejection which have also been applied to some of the newly added claims.

12. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

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A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action. .

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Stevan A. Resan whose telephone number is (703) 308-4287. The examiner can normally be reached on Tues-Fri from 7:30AM to 6:00PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Paul Thibodeau, can be reached on (703) *308-2367. The fax phone number for the organization where this application or proceeding is assigned is (703) 305-7718


STEVAN A. RESAN
PRIMARY EXAMINER